

AMENDMENT UNDER 37 C.F.R. § 1.111
U.S. Patent Appln. No. 09/734,684

REMARKS

Reconsideration and allowance of the subject application are respectfully requested.

Upon entry of this Amendment, claims 1-19 are pending in the application with claims 2-6 and 9-19 being withdrawn from consideration as being directed non-elected species. In response to the Office Action (Paper No. 8), Applicant respectfully submits that the pending claims define patentable subject matter.

Claims 1, 7 and 8 are rejected under 35 U.S.C. § 112, second paragraph, as being indefinite because the Examiner maintains that the claims contain terms which are unclear and lack an antecedent basis. By this Amendment, Applicant has amended claims 1, 7 and 8 to improve clarity. Accordingly, the Examiner is requested to remove the § 112, second paragraph, rejection of record.

Claim 1 is rejected under 35 U.S.C. § 102(e) as being anticipated by Enomoto et al. (USP 6,211,587; hereafter “Enomoto”). Claims 7 and 8 are rejected under 35 U.S.C. § 103(a) as being unpatentable over Enomoto. Applicant respectfully traverses the prior art rejections.

Enomoto is directed to an electric rotating machine including a stator and a rotor. As shown in Figures 1, the stator 1a comprises a core 2a and coils 10a which are inserted into slots 11 of the core 2a. The stator core 2a is formed by laminating silicon steel plates 11 and bending the laminated silicon steel sheets 11 into an annular shape. A pair of bearing holder portions 6a and 6b having bearings 8a and 8b are attached at both ends of the stator core 2a so as to cover coil end portions of coils 10a extending from both sides of the stator core 2a. An outer frame 4 covers a periphery of the stator core 2a. The outer frame 4 is formed by four semi-cylindrical

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portions 4a to 4d which are held together with compressive force in the axial direction between bearing holder portions 6a and 6b via bolts 9a and nuts 9b.

Independent claim 1 recites a core of the stator comprises (1) an inner ring core formed of laminated magnetic plate members having a plurality of teeth integrally provided on an inner side thereof, coils disposed in slots formed between the teeth, end faces of the laminated magnetic plate members contacting each other; and (2) an outer ring core formed of at least one magnetic member and cylindrical in shape, fitted on an outer circumferential surface of the inner ring core and holding the inner ring core. The Examiner maintains that Enomoto discloses the claimed outer ring core via the outer frame 4. However, the outer frame 4 is not part of the stator or core of the stator. Rather, the outer frame 4, along with the bearing holder portions 6a and 6b, form a frame or housing for enclosing and supporting the stator and the rotor of the electric induction machine. That is, the outer frame 4 is not part of the stator or the core of the stator since the outer frame 4 is assembled after the stator is constructed by compressing the four semi-cylindrical portions 4a to 4d in the axial direction between bearing holder portions 6a and 6b by bolts 9a and nuts 9b. Thus, the outer frame 4 is not part of the assembled stator 1a (i.e., the outer frame 4 can not stand alone with the stator 1a) since the four semi-cylindrical portions 4a to 4d can not be secured together to form the outer frame 4 without completing the final assembly of the electric induction machine by bolting together the bearing holder portions 6a and 6b. Moreover, Enomoto does not teach or suggest that the outer frame is formed of a magnetic member, as claimed, and thus, is not part of the stator or the core of the stator.

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Further, Enomoto teaches that the stator teeth 20 and the stator core are separately manufactured and the stator teeth 20 are subsequently attached to the stator core 20. On the other hand, the present invention teaches that the teeth and stator core are integrally manufactured together thereby achieving improved dimensional precision in positioning the teeth. That is, the present invention teaches that a plurality of magnetic plate members having a plurality of teeth are laminated and curved, and two end faces are brought into contact to form a ring. In such a manufacturing process, the dimensional precision is reduced as compared with manufacturing the stator core by initially punching it into a ring shape. To solve this problem of reduced dimensional precision, the present invention teaches that it is an essential requirement to integrally form the teeth on the magnetic plate members of the stator core.

Accordingly, Applicant respectfully submits that independent claim 1, as well as dependent claims 7 and 8, would not have been anticipated by or rendered obvious in view of Enomoto because the applied reference does not teach or suggest all of the features of the claims.

In view of the above, reconsideration and allowance of this application are now believed to be in order, and such actions are hereby solicited. If any points remain in issue which the Examiner feels may be best resolved through a personal or telephone interview, the Examiner is kindly requested to contact the undersigned at the telephone number listed below.

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Applicant hereby petitions for any extension of time which may be required to maintain the pendency of this case, and any required fee, except for the Issue Fee, for such extension is to be charged to Deposit Account No. 19-4880.

Respectfully submitted,



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